28GTTO"ESOTSOOT

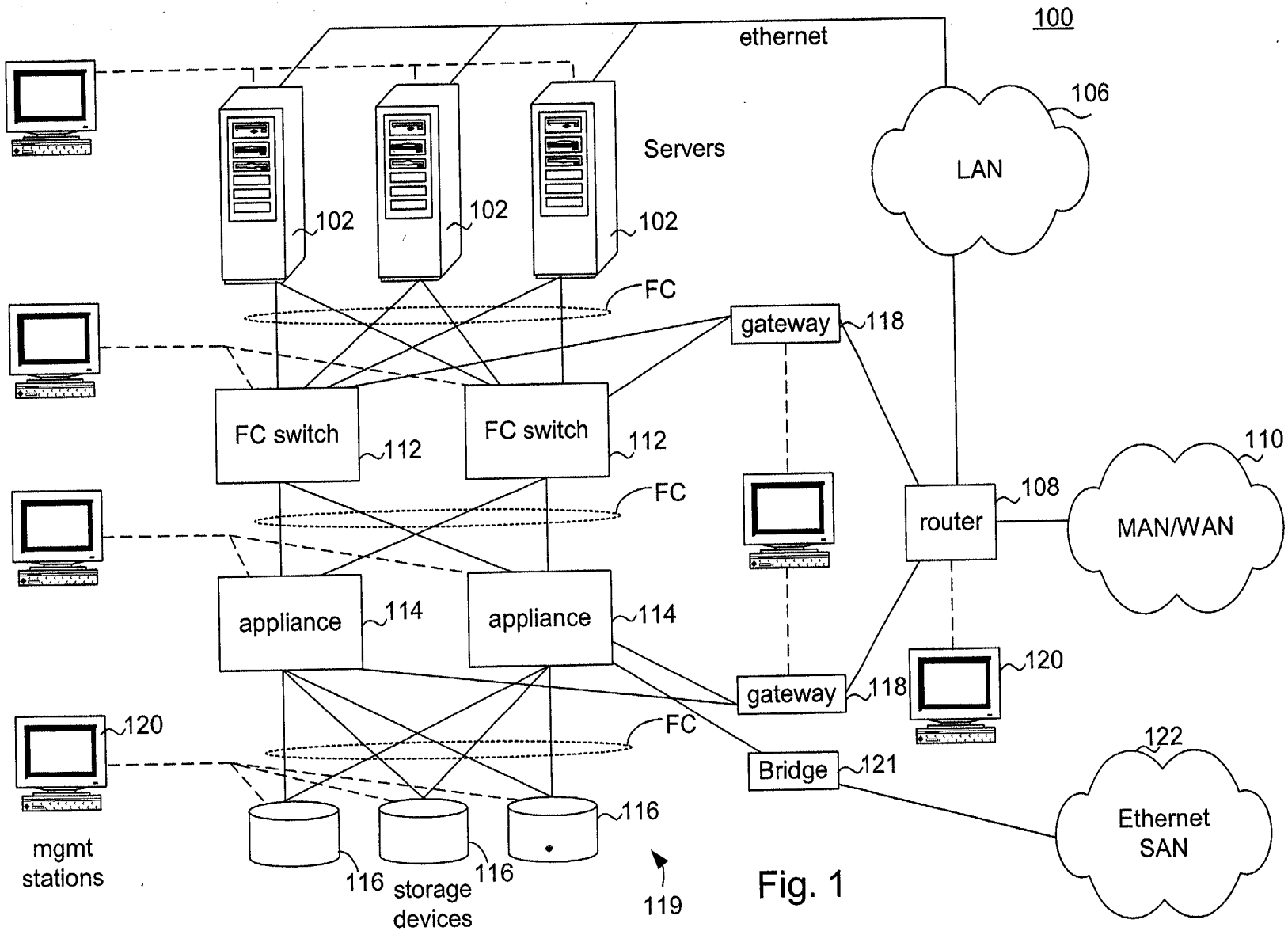

Fig. 1

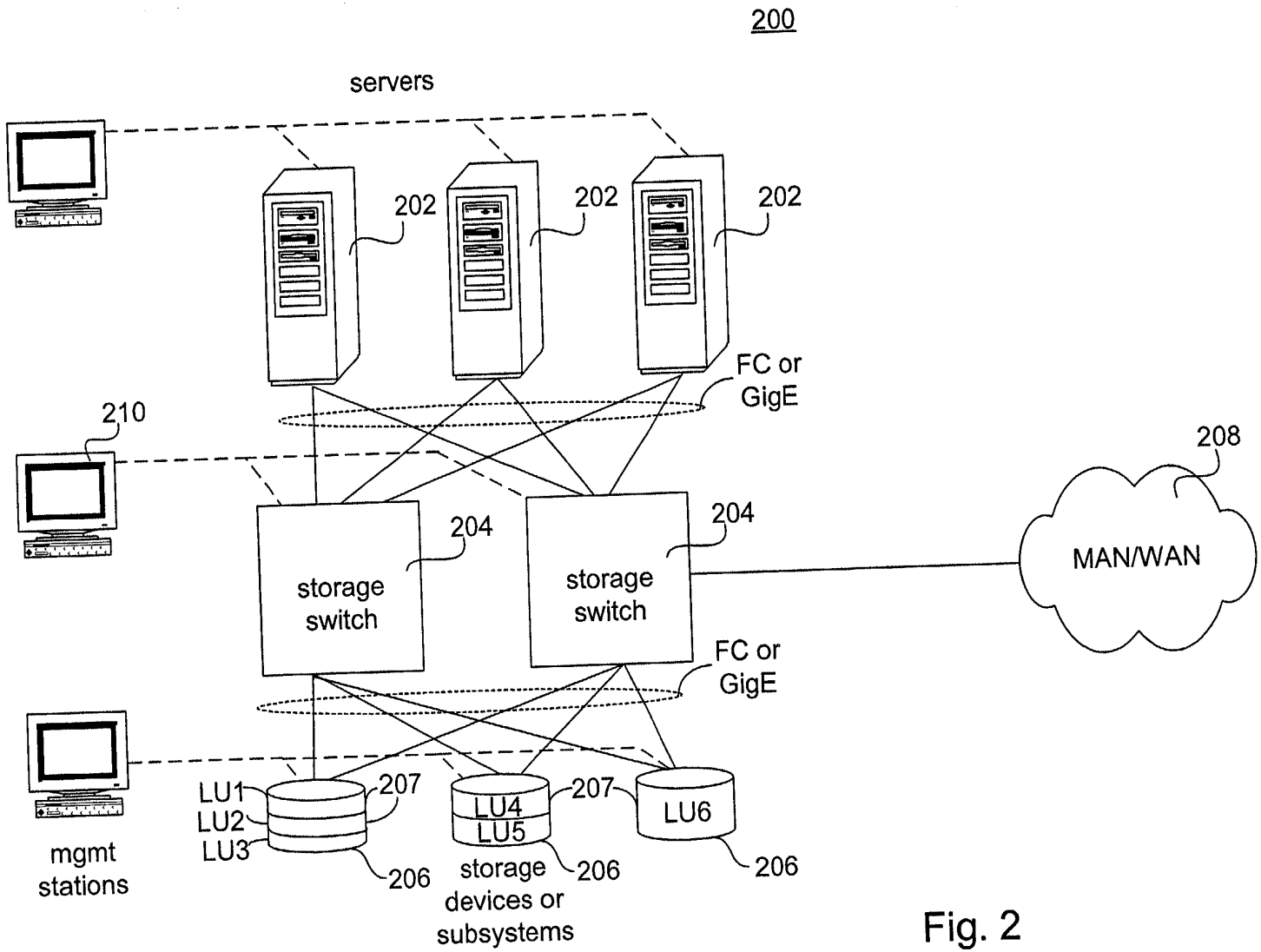
200
servers
202
202
202
FC or
GigE
210
208
204
204
storage
switch
storage
switch
MAN/WAN
FC or
GigE
LU1
LU2
LU3
207
LU4
LU5
207
LU6
mgmt
stations
206
storage
devices or
subsystems
206
206

Fig. 2

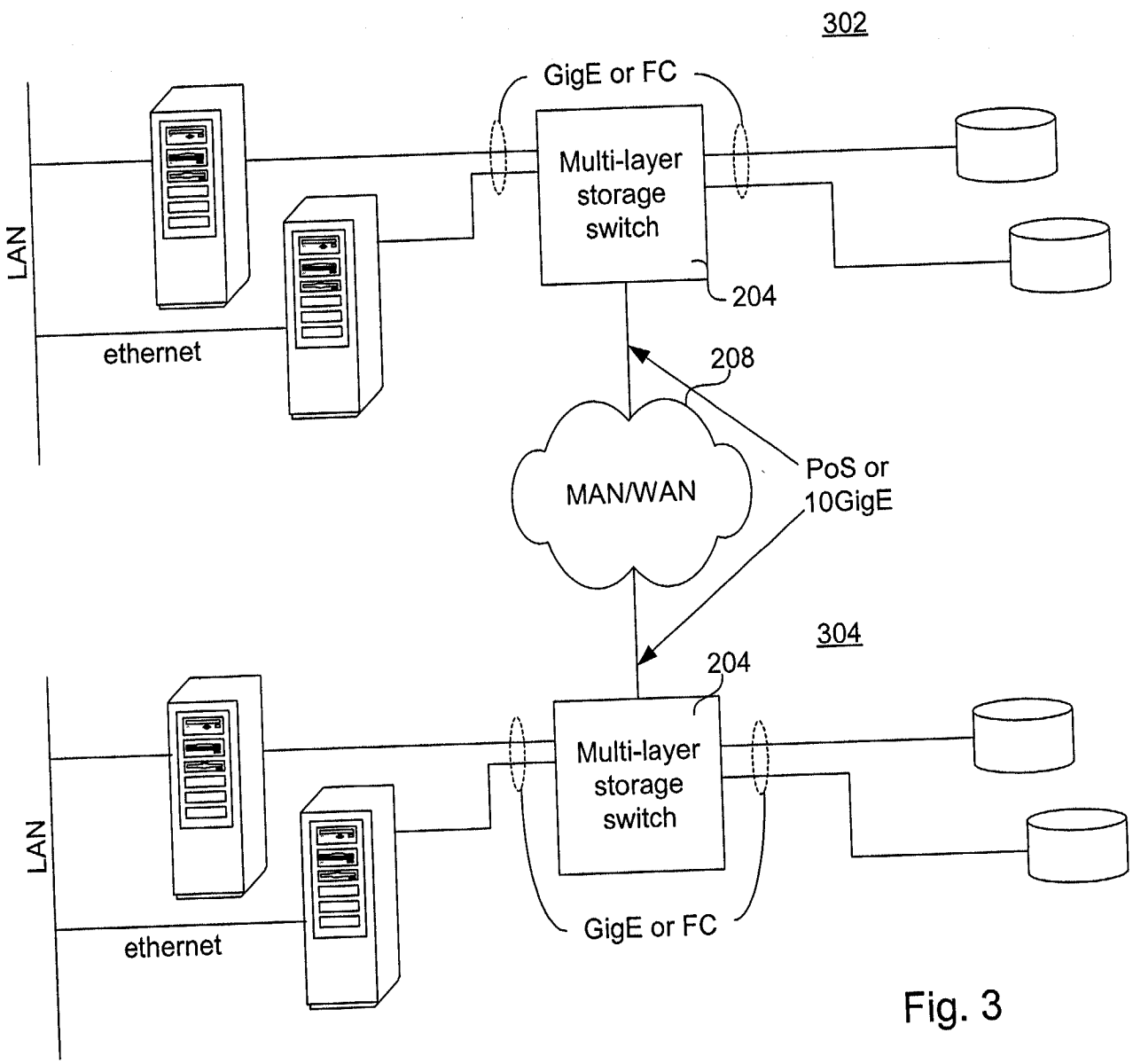
302
GigE or FC
Multi-layer storage switch
204
LAN
ethernet
208
PoS or 10GigE
MAN/WAN
304
204
Multi-layer storage switch
LAN
ethernet
GigE or FC

Fig. 3

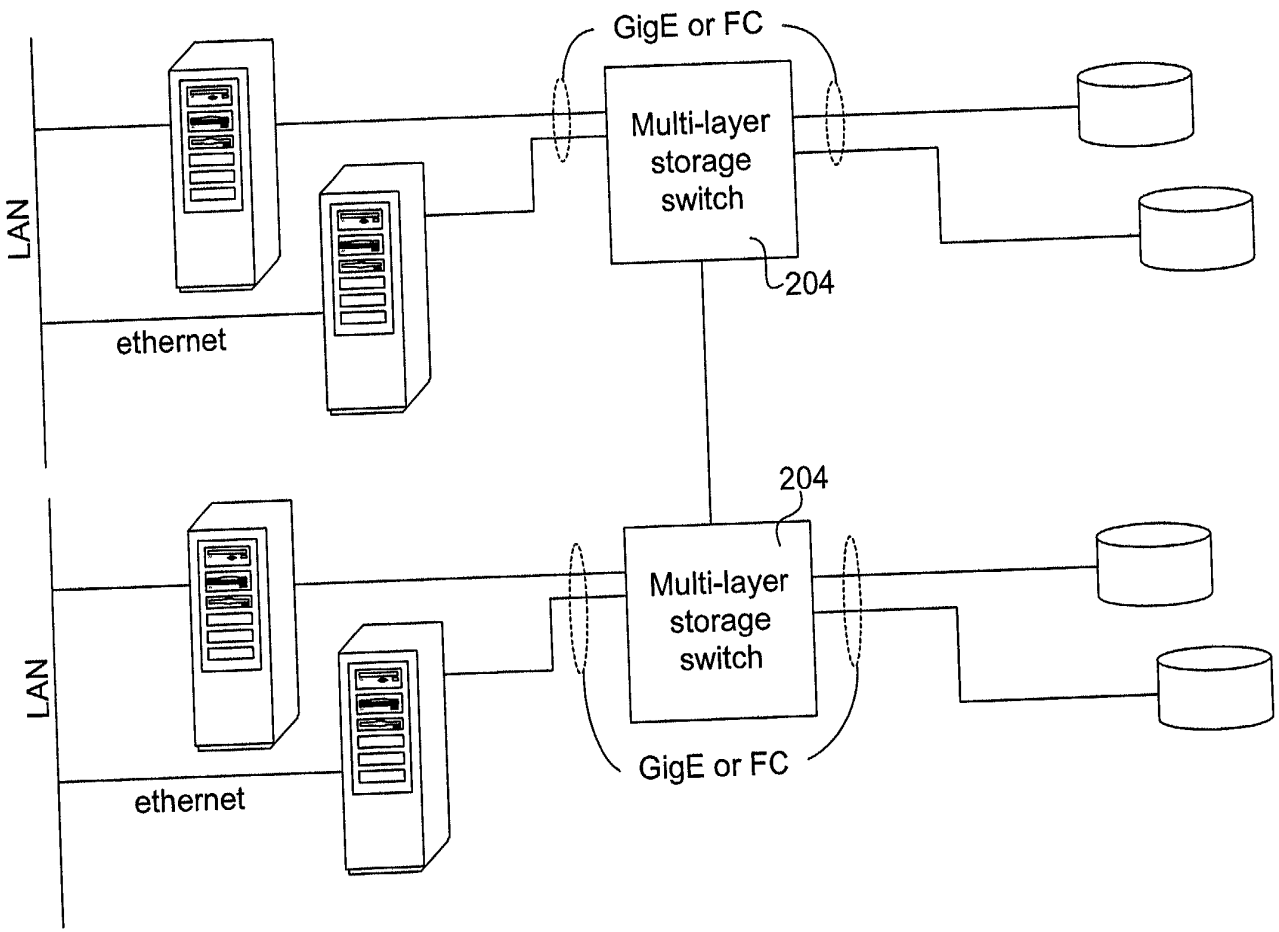
GigE or FC
Multi-layer storage switch
204
LAN
ethernet
204
Multi-layer storage switch
LAN
ethernet
GigE or FC

Fig. 4

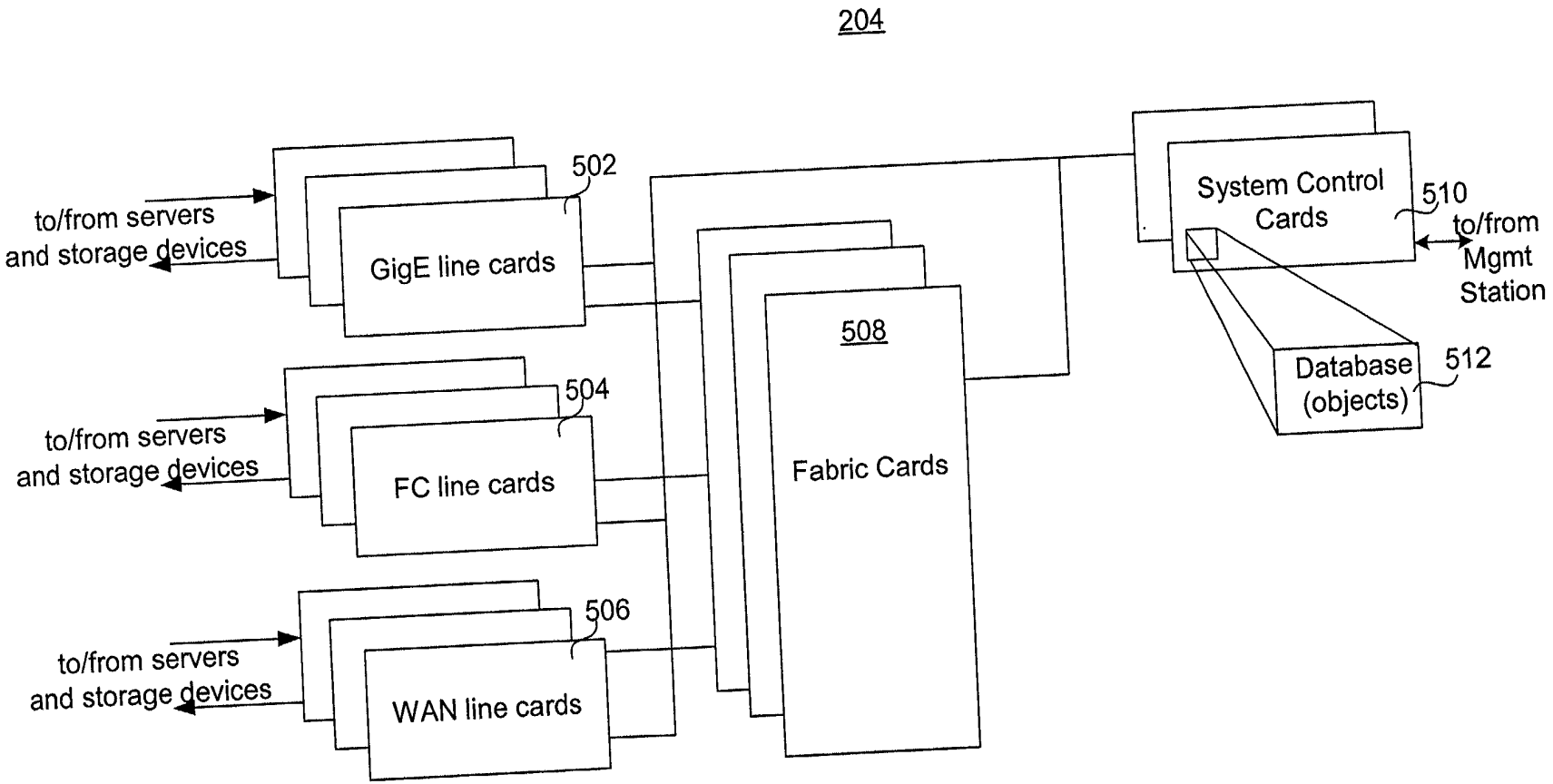
204
to/from servers and storage devices
GigE line cards
502
to/from servers and storage devices
FC line cards
504
to/from servers and storage devices
WAN line cards
506
508
Fabric Cards
System Control Cards
510
to/from Mgmt Station
Database (objects)
512

Fig. 5

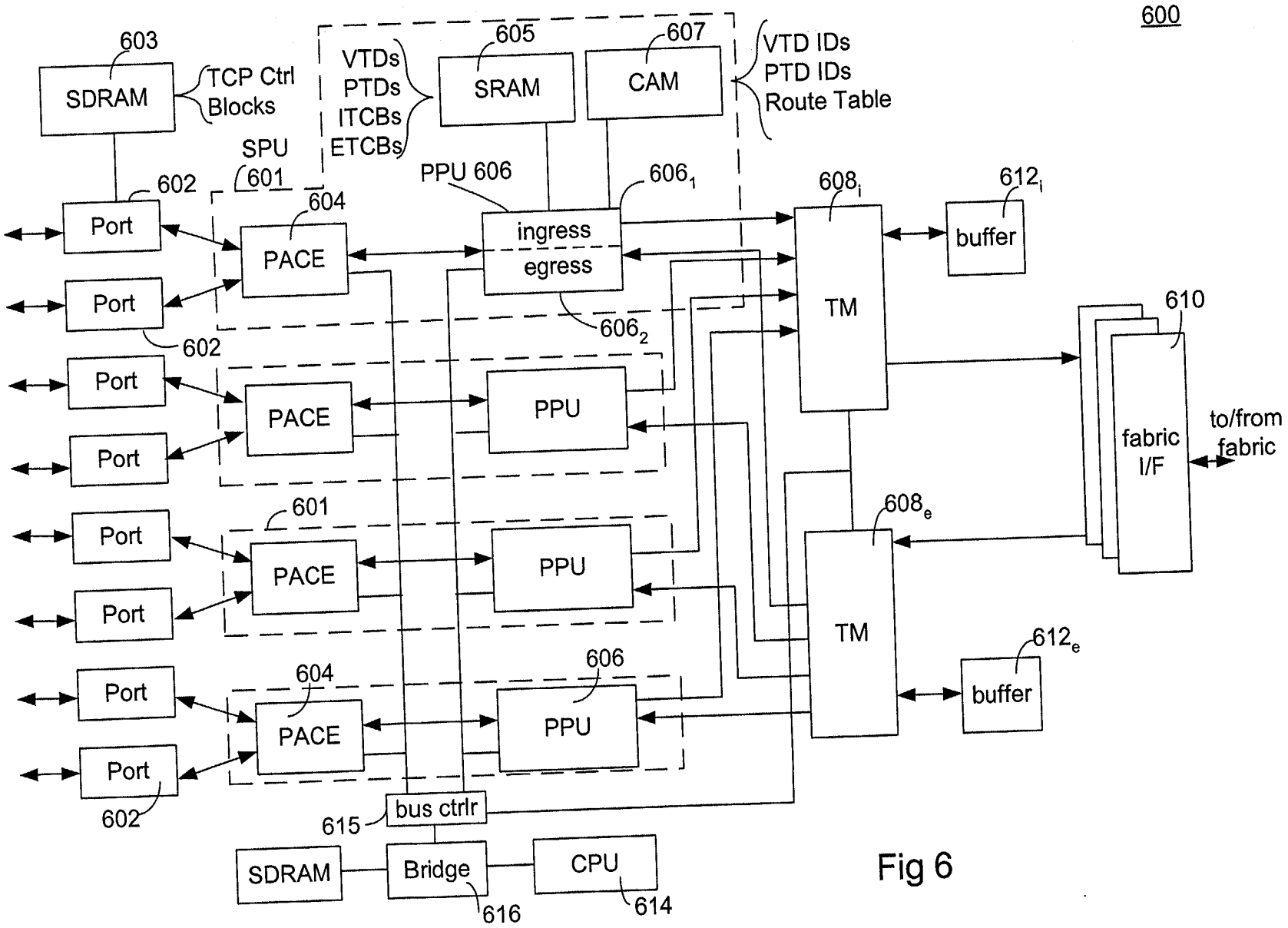
600
603
SDRAM
TCP Ctrl Blocks
VTDs
PTDs
ITCBs
ETCBs
605
SRAM
607
CAM
VTD IDs
PTD IDs
Route Table
SPU
601
602
Port
604
PACE
PPU 606
606$_1$
ingress
egress
606$_2$
608$_i$
612$_i$
buffer
TM
610
fabric I/F
to/from fabric
PPU
608$_e$
612$_e$
615
bus ctrlr
SDRAM
Bridge
CPU
616
614

Fig 6

VTD

- Session ID/FCP D_ID
- VTD ID
- FlowID
- Extent Descriptors (e.g., size, location)
  - -- for each mirrored member if more than one member
- # of outstanding commands
- Max # of commands
- Response time
- LUN
- TCP control block index
- S_ID/D_ID
- MaxCmdSN
- Total open sequences

Fig. 7a

PTD

- Session ID/FCP D_ID
- LUN
- Block Offset
- Size
- VTD ID

Fig. 7b

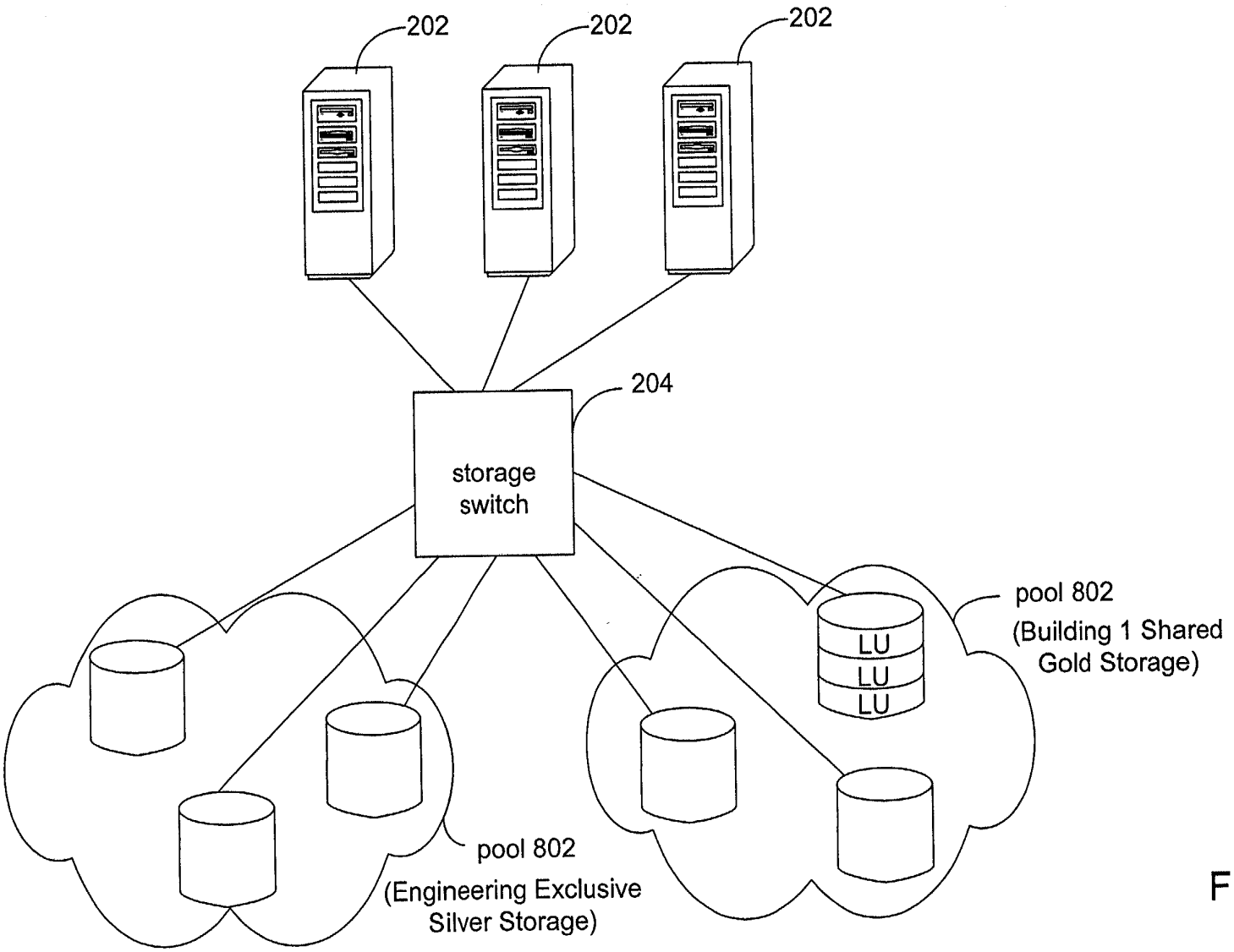
202
202
202
204
storage switch
pool 802
(Building 1 Shared Gold Storage)
LU
LU
LU
pool 802
(Engineering Exclusive Silver Storage)

Fig. 8

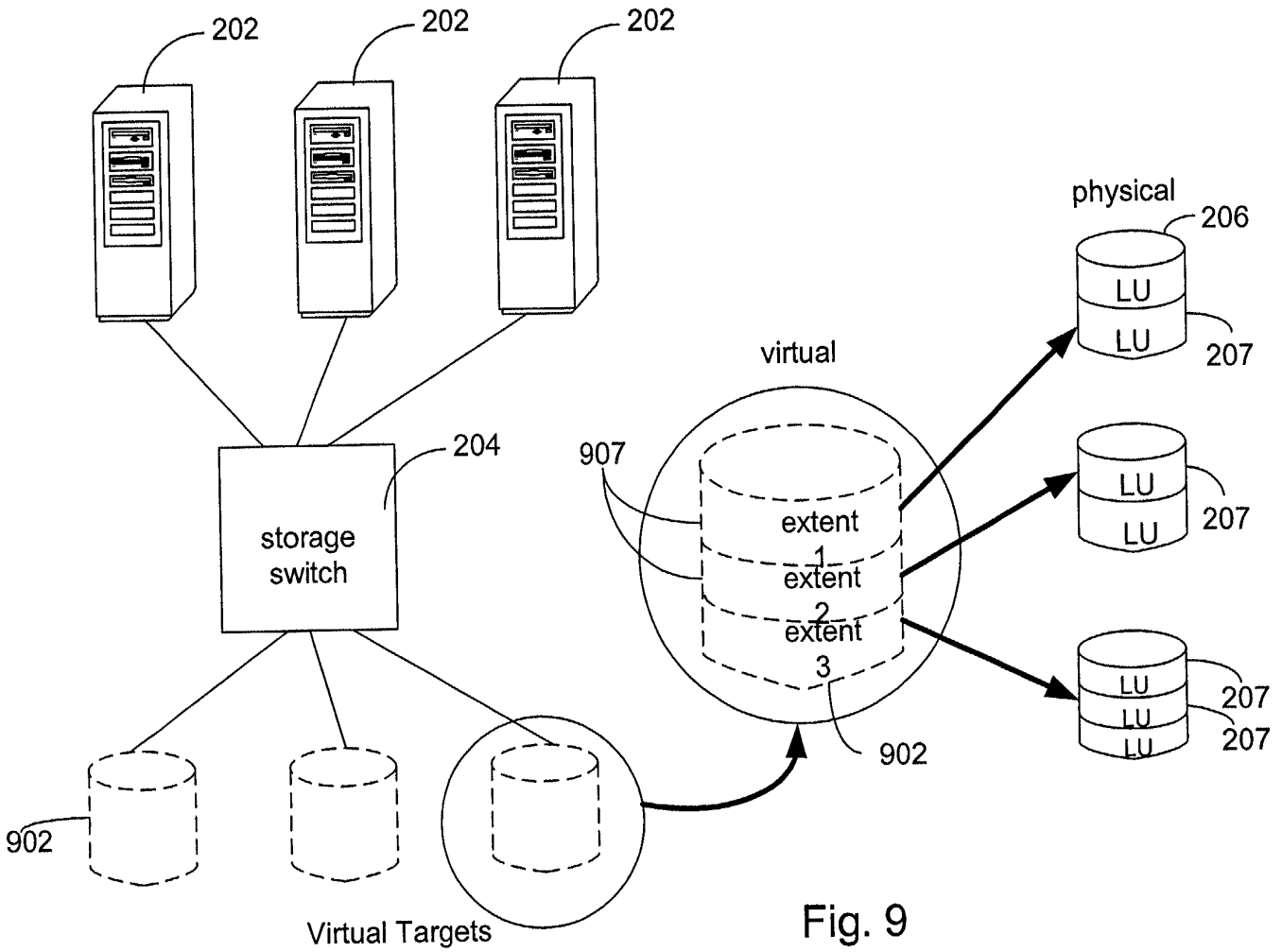
202
202
202
204
storage switch
907
virtual
extent 1
extent 2
extent 3
902
physical
206
LU
LU
207
LU
LU
207
LU
LU
LU
207
207
902
Virtual Targets

Fig. 9

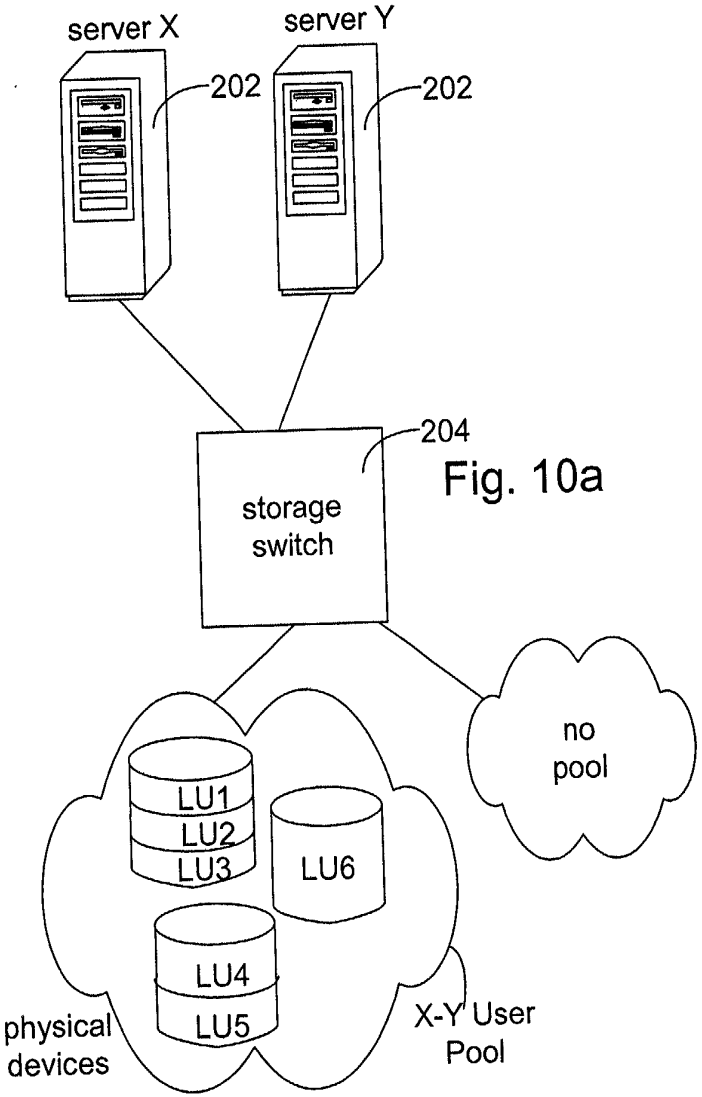

Fig. 10a

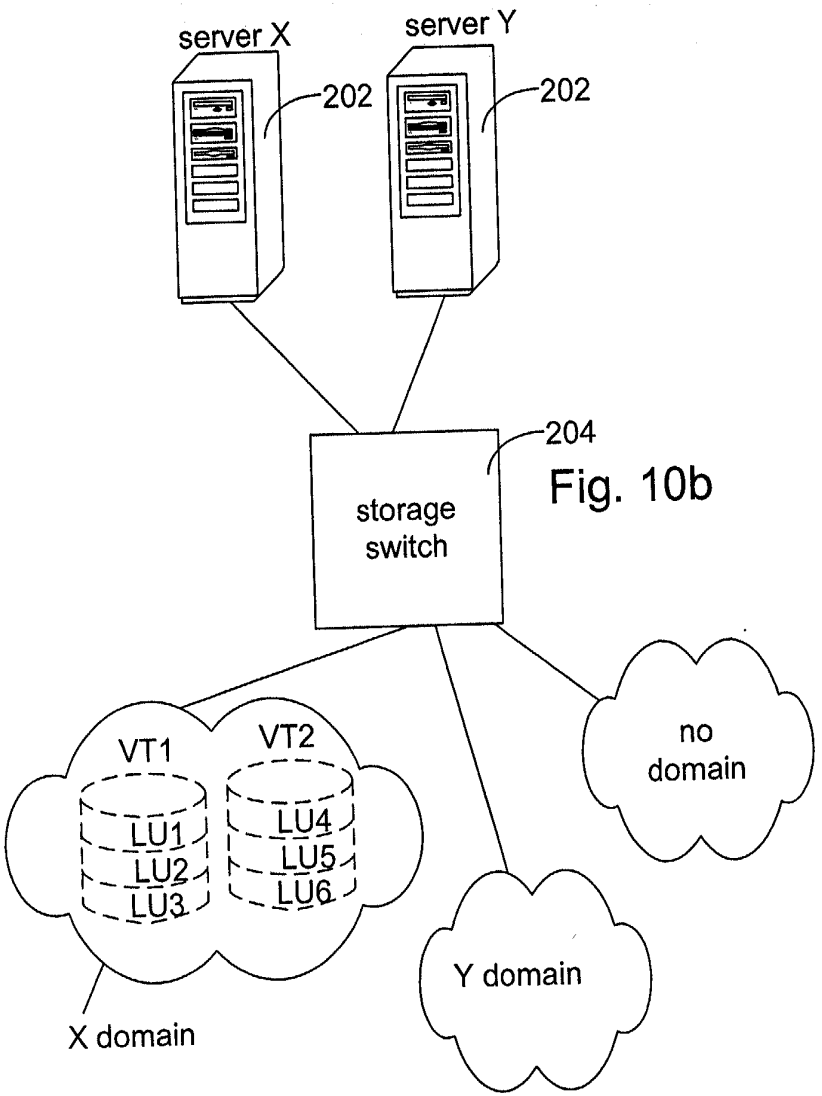

Fig. 10b

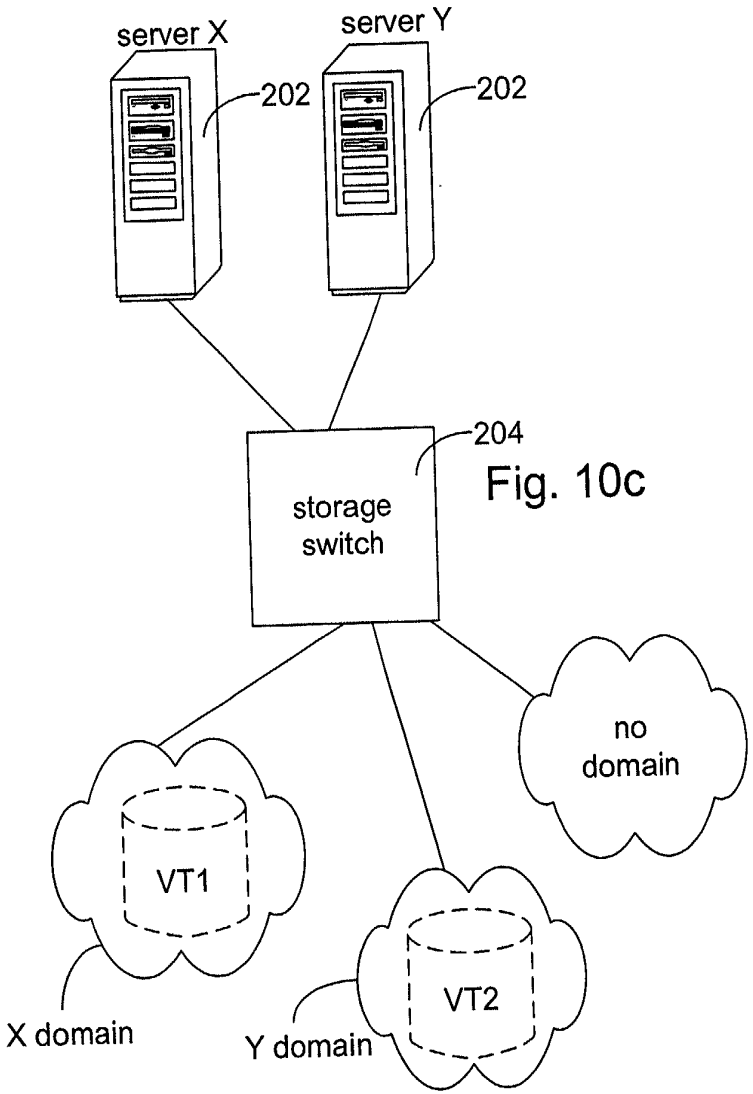

Fig. 10c

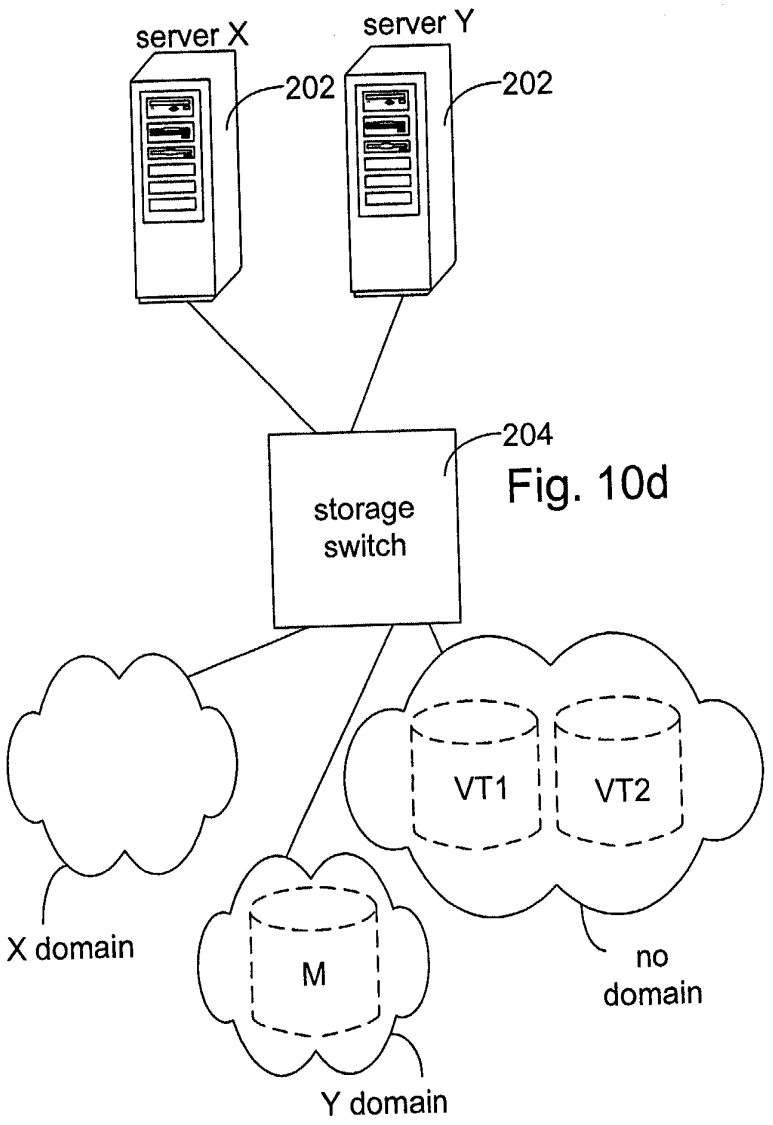

Fig. 10d

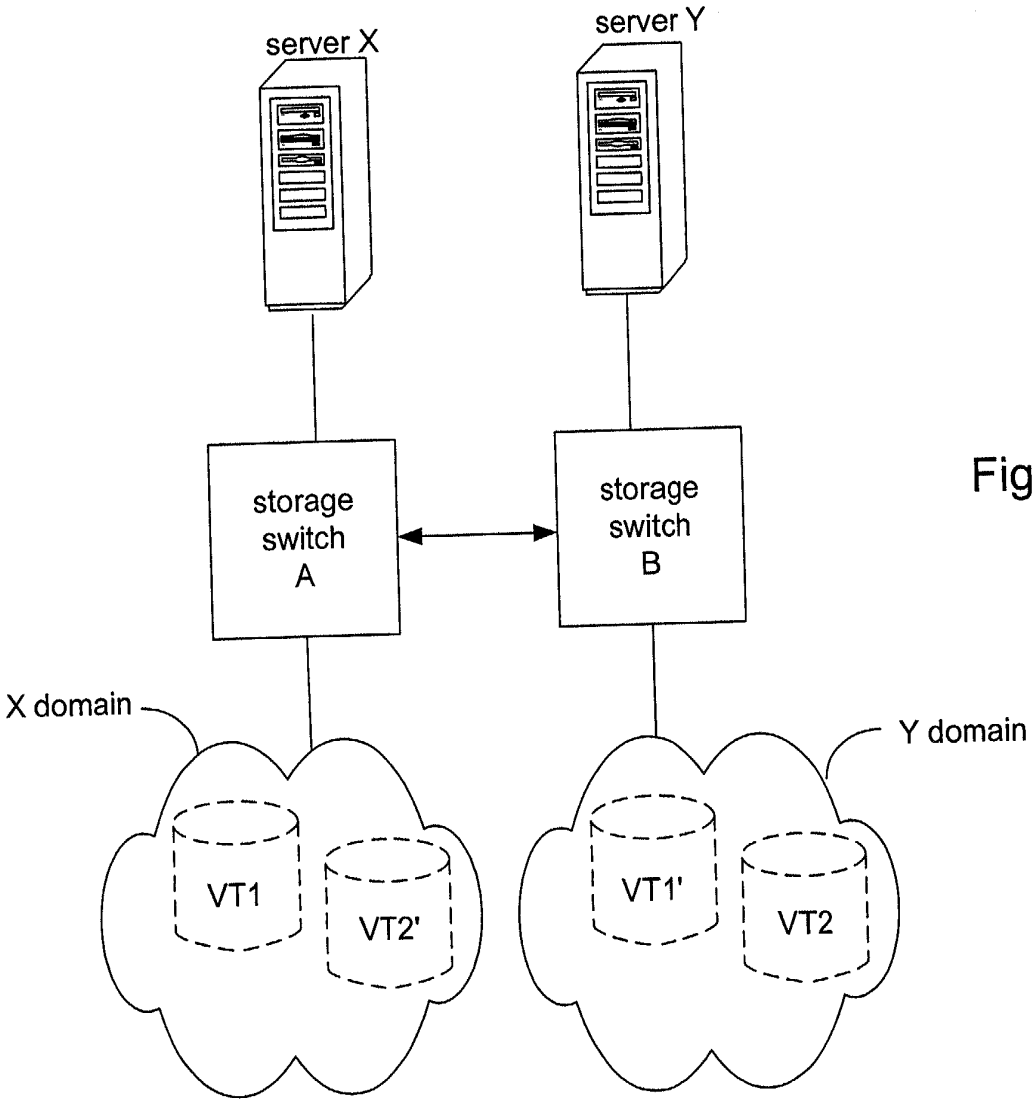
server X
server Y
storage switch A
storage switch B
X domain
Y domain
VT1
VT2'
VT1'
VT2

Fig. 11

20070 ESOFSOOT

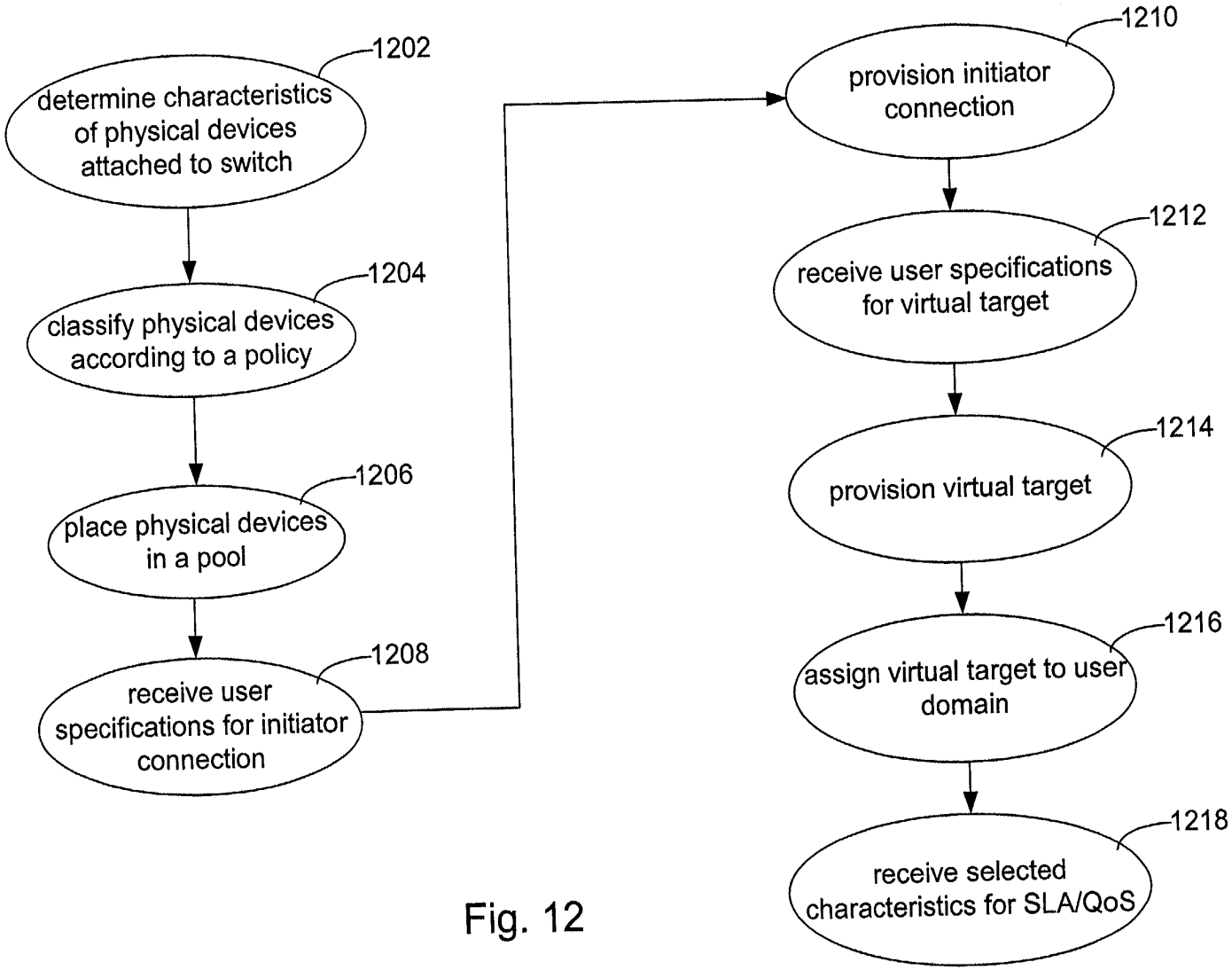

Fig. 12

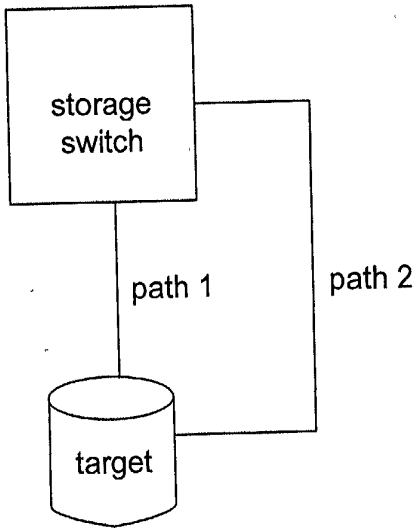

Fig. 13a

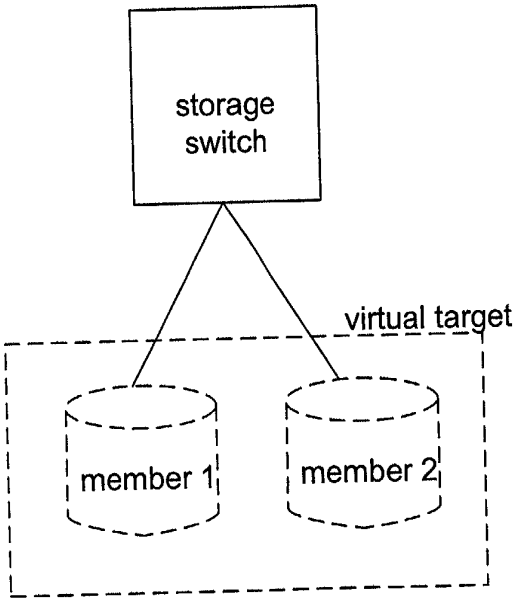

Fig. 13b